Gulf of Mexico Harmful Algal Bloom Bulletin

21 September 2005

National Ocean Service

National Environmental Satellite, Data, and Information Service

Last bulletin: September 19, 2005

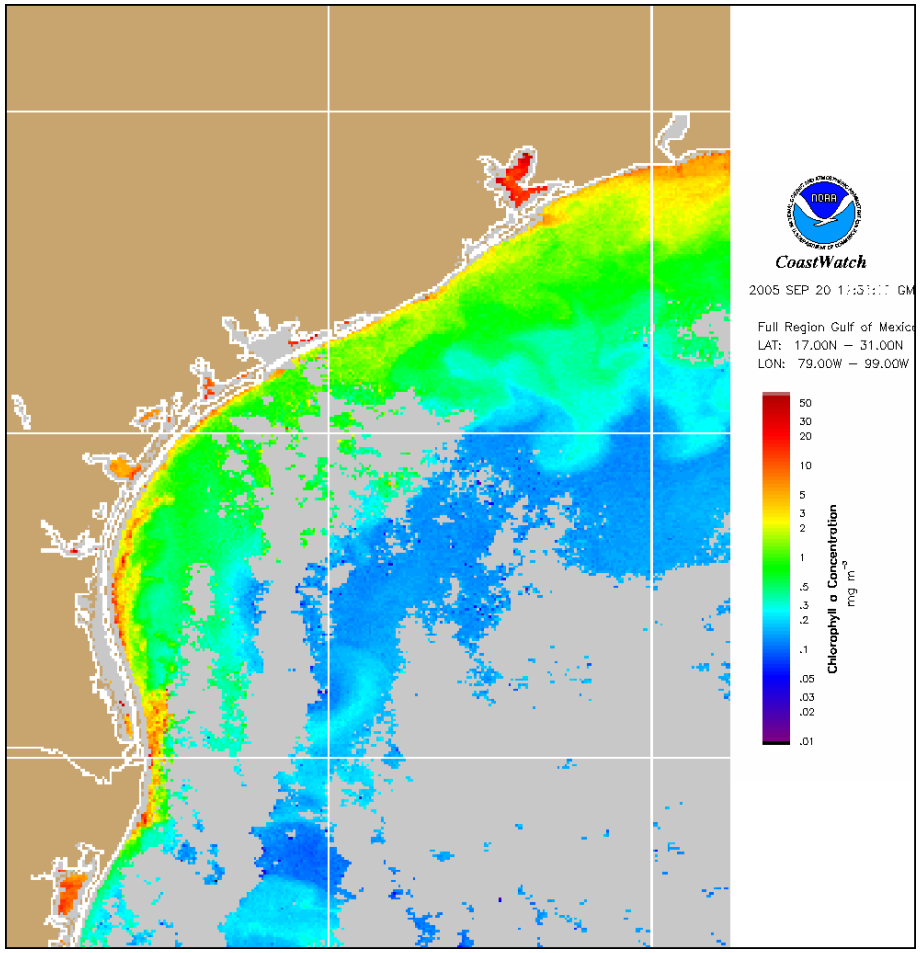
Analysis:

This is an advisory bulletin, produced as part of a pre-operational program for the western Gulf of Mexico. Subsequent bulletins will be produced as practical.

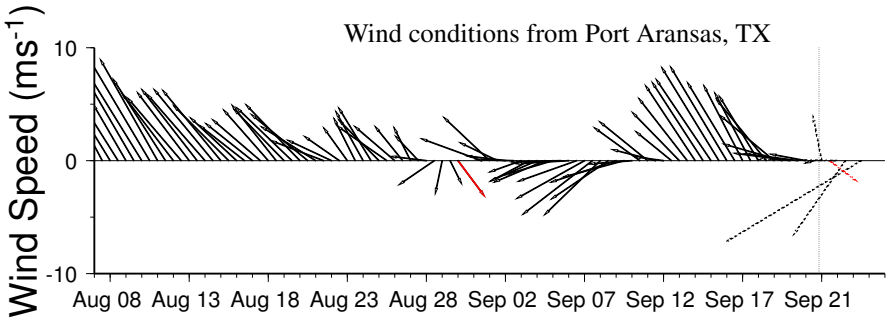
Bloom patches around Brownsville and south Padre Island within a few miles of shore. These are generally consistent with reported areas of Karenia bloom. Southward transport can be expected this week.

Hurricane Rita can be expected to produce extensive resuspension of bottom sediments. This will lead to blooms of non-harmful algae, which could last for weeks, causing difficulties in identifying any HABs during that time. Tropical storms in the eastern Gulf of Mexico have not eliminated existing HABs, so it should not be presumed that Rita will cause dissipation.

--Stumpf

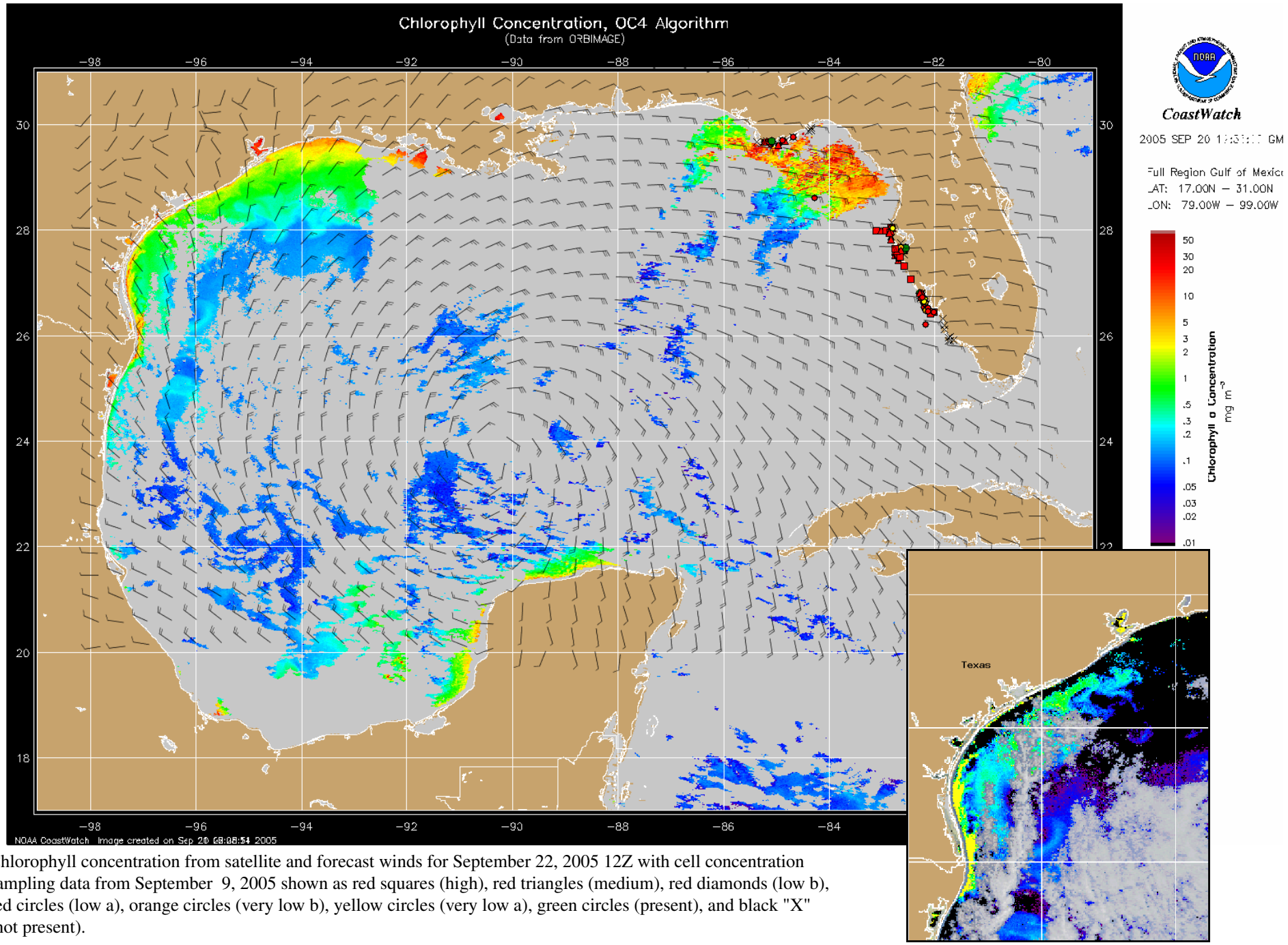


Chlorophyll concentration from satellite with HAB areas shown by red polygon(s).



Wind speed and direction are averaged over 12 hours from measurements made on buoys. Length of line indicates speed; angle indicates direction. Red indicates that the wind direction favors upwelling near the coast. Values to the left of the dotted vertical line are measured values; values to the right are forecasts.

Hurricane Rita is expected to bring tropical storm strength winds to the south Texas coast later in the week.



Chlorophyll concentration from satellite and forecast winds for September 22, 2005 12Z with cell concentration sampling data from September 9, 2005 shown as red squares (high), red triangles (medium), red diamonds (low b), red circles (low a), orange circles (very low b), yellow circles (very low a), green circles (present), and black "X" (not present).

Blooms shown in red (see p. 1 analysis)